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July 16, 2001

Dennis Faulk
U.S. E.P.A.
712 Swift Blvd, Suite 5
Richland, WA 99352

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EDMC

Re: Further comments on the B Reactor EE/CA

Dear Dennis,

This is a follow-up to our comments at the EE/CA public meeting on June 26. We still strongly support Alternative #3—to preserve B Reactor and make it accessible to the public. To that end, we offer the following comments for your consideration, with respect to the Rev. 0 version of the EE/CA document, DOE/RL-2001-09 dated June 2001.

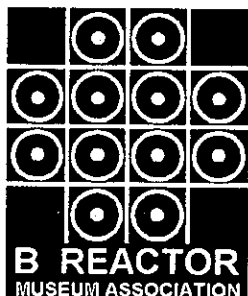
Hazards

In Sections 2.3 and 2.4, a dozen contaminants are listed, but only for the radiological contaminants is a risk evaluation provided. An evaluation should be provided for *all* hazardous materials, both radioactive and nonradioactive. Also, it is misleading to state that the radiological contaminants “include mixed fission products such as. . .” Given the time that has elapsed since reactor operation, virtually all of the fission product activity would be from Sr-90 and Cs-137.

The risk evaluation provided in Section 2.4 does not include any supporting data, so the basis for the assumptions is unclear. Are there data to show where on the tour route this dose would be received, and therefore what areas could be more thoroughly cleaned, have barriers installed or shielding provided, or have other dose reduction measures taken?

There is no basis or justification given for the assumption that the average dose rate on the proposed tour route is 0.01 mrem/h above (natural) background levels. Rather, surveys of the facility including those in various BHI documents cited indicate that there is *no* detectable ambient radiation field above natural background along virtually the entire tour route.

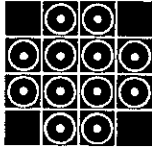
The assumption that a tour guide would be on the tour route 2000 hours annually is likewise unjustified; tour guides are likely to be part-time volunteer personnel who



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have received radiation worker training. In any case, a tour guide working 2000 hours per year would be an employee, and could receive radiation worker training and be classified as a radiation worker. Thus the 15 mrem/y cited as the guideline for general exposure would not apply. That 15 mrem/y guideline is cited without reference; the permissible annual limit for members of the general public put forth in both the DOE and Nuclear Regulatory Commission regulations (10CFR835 and 10CFR20) is 100 mrem; the 15 mrem guideline seems to have been drawn from 40CFR190, which is applicable only to “nuclear power operations,” and the definition included therein would seem to exclude the B Reactor facilities, which have never been a part of the uranium fuel cycle or nuclear power production. Clearly, clarification is needed here.

Clarification is also needed with respect to the range of acceptable risk cited on page 2-8, which is given as one one-millionth to one ten-thousandth. Is this the acceptable risk per day, per year, or per lifetime? The time frame needs to be stated. Also, does not the range given refer to the *maximum* acceptable risk, rather than the *range* of acceptable risk? Again, clarification is needed because, if it is correct as stated, it means a risk *lower* than one in a million is *unacceptable*!

The penultimate paragraph in Section 2.4 contains a number of unsupported general statements without reference to the specific level of risk. Such statements contribute little and indeed detract from the report. It could even be argued that if such statements are to be included, then perhaps they should be augmented by the addition of other statements of potential, e.g. there is a risk that a person might be exposed to diesel fumes from large delivery vehicles, or that a person may incur a risk of injury or death from a highway accident while en route to or from the facility. In any case, the risk of contamination spread from transfer or contact with wildlife would seem to be trivial and, if mentioned at all, should be identified as such.

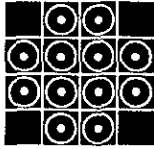
Encourage public access.

The preferred alternative (#3) is based on the assumption that the reactor has historical importance and should be preserved and updated to allow the public to see it. We encourage the EPA to encourage the DOE to expedite this goal so that, someday, the reactor and the public will each get the museum they deserve. The more people who see the building, the more justified will be the hazards mitigation expenses.

Also, in light of the expressed purpose of Alternative #3—to allow public access to this historic reactor—the current policies that restrict access to the reactor must be reviewed and hopefully simply abolished. Specifically, visitors are currently subjected to security badging and radiological training, and people younger than 18 and those who are not U.S. citizens are altogether excluded from the reactor.

Accessible rooms in the reactor

We notice that the colored floor plan on page 4-9 does not include the existing restrooms in either the current or proposed tour route. This is also true of the three rooms off the “Office/Storage Room” #228, off the main hallway near the main entrance. Access to the restrooms should certainly



be included in the tour route, at least until new facilities are built. The rooms off room #228 may not serve as part of the tour route, but they will undoubtedly be useful as storerooms or offices, and so should be defined as being usable. Other areas that should be opened as exhibit rooms, offices, or storage were noted at the public hearing. It was suggested that another category of accessibility could be created, such as Usable Facility Area versus Tour Route

The grounds around the reactor do not seem to be included in the EE/CA, but we envision outside displays and accoutrements for visitors, especially the display of Hanford-related locomotives and hot-fuel cask cars and, someday, a path or road from the railroad siding to the museum for the passengers on the tour trains we envision coming to B Reactor.

There is currently a doorway in the southwest corner of the work area leading into the exhaust fan rooms (towards the south) that is not shown on the floor plans. This is in the same corner of the work area where another doorway leads into the valve pit toward the west. Was this doorway accidentally left off the floor plan, or is it planned to be removed?

Historic preservation during facility upgrades

In terms of historic preservation, there will undoubtedly be many key decisions that will have to be weighed against the architectural value of the building. A good example are the large ventilation ducts that snake across the roof of the building. These are aging and will complicate the job of replacing the roof. However, they are also a defining element of the building that have been in place since the reactor was built, and should therefore be given every consideration for their preservation. We look forward to the historical review that will be provided by the Washington SHPO and hopefully requested from stakeholders and others.

In regards to the issue of historic preservation is the even more important one—that of the removal of the reactor's core in 75 years. We agree quite strongly with the EE/CA's statement on page 1-3, that the ROD needs to be revised to allow other options for B Reactor. Historic preservation is normally measured in terms quite a bit longer than 75 years.

Thank you for this opportunity to express our remarks, questions, and concerns about the B Reactor EE/CA, a document that does an excellent job of merging prior reports and surveys. We are pleased and impressed with the DOE's progress in putting B Reactor on a path towards preservation.

Sincerely,

Gene Weisskopf
President, BRMA